

**STATEMENT OF BASIS (AI No. 282)**

for draft Louisiana Pollutant Discharge Elimination System permit No. LA0002909 to discharge to waters of the State of Louisiana.

**THE APPLICANT IS:** CEMUS, LLC  
3458 Drusilla Lane  
Baton Rouge, LA 70809

**ISSUING OFFICE:** Louisiana Department of Environmental Quality (LDEQ)  
Office of Environmental Services  
Post Office Box 4313  
Baton Rouge, Louisiana 70821-4313

**PREPARED BY:** Yvonne Baker

**DATE PREPARED:** November 25, 2008

**1. PERMIT STATUS****A. Reason For Permit Action:**

Permit reissuance of a Louisiana Pollutant Discharge Elimination System (LPDES) permit for a 5-year term.

**B. NPDES permit –** NPDES permit effective date: N/A  
NPDES permit expiration date: N/A  
EPA has not retained enforcement authority.

**C. LPDES permits –**  
LPDES permit effective date: September 1, 2003  
LPDES permit expiration date: August 31, 2008

**D. Date Application Received:** August 29, 2008

**2. FACILITY INFORMATION****A. FACILITY TYPE/ACTIVITY - chemical bulk storage and transfer facility**

The facility is operating as an ethanol transfer facility and has plans to expand to handle storage of asphalt, residual fuel, and petroleum black. The facility was previously permitted as an inactive industrial inorganic chemicals alumina – manufacturing plant. The site has been inactive since 1983. The discharges from this facility consist of industrial stormwater runoff.

**B. FEE RATE**

1. Fee Rating Facility Type: minor
2. Complexity Type: II
3. Wastewater Type: III
4. SIC code: 4226 and 5169

**C. LOCATION -** 1201 Airline Highway in Baton Rouge, East Baton Rouge Parish  
Latitude 30° 30' 25", Longitude 91° 11' 28"

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### 3. **OUTFALL INFORMATION**

#### Outfall 001

Discharge Type: industrial stormwater runoff from the north side of the facility  
Treatment: none  
Location: at the point of discharge from the manhole near the bridge overpass, north of the former main processing area prior to combining with other waters  
Flow: intermittent  
Discharge Route: via pipe to the Mississippi River

#### Outfall 002

Discharge Type: industrial stormwater runoff from the south side of the facility  
Treatment: none  
Location: at the point of discharge from the Monte Sano Bayou pipe prior to combining with other waters  
Flow: intermittent  
Discharge Route: via pipe to Monte Sano Bayou

#### Outfall 020

This outfall has been deleted.

#### Outfall 020 (A)

This outfall has been deleted.

#### Outfall 020 (B)

This outfall has been deleted

Outfalls 020, 020 (A), and 020 (B) have been deleted. The discharges from these outfalls are the responsibility of Pine Bluff Sand & Gravel/River Mountain Quarries.

### 4. **RECEIVING WATERS**

STREAM - via pipe to the Mississippi River (Outfall 001)

BASIN AND SEGMENT - Mississippi River Basin, Segment 070201

DESIGNATED USES -

- a. primary contact recreation
- b. secondary contact recreation
- c. propagation of fish and wildlife
- d. drinking water supply

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STREAM - via pipe to Monte Sano Bayou (Outfall 002)

BASIN AND SEGMENT - Mississippi River Basin, Segment 070504

DESIGNATED USES -   b. secondary contact recreation  
                          l. limited aquatic life and wildlife use

## 5. TMDL STATUS

The discharges from CEMUS, LLC are to the Mississippi River, Subsegment 070201 of the Mississippi River Basin. Subsegment 070201 is not listed on LDEQ's Final 2006 303(d) List as impaired, and to date no TMDL's have been established. A reopener clause will be established in the permit to allow for the requirement of more stringent effluent limitations and requirements as imposed by any future TMDLs.

Subsegment 070504, Monte Sano Bayou-From US-61 to Mississippi River, is listed on LDEQ's Final 2006 303(d) List as impaired for dissolved oxygen and chlorine. To date no TMDLs have been completed for this waterbody. A reopener clause will be established in the permit to allow for the requirement of more stringent effluent limitations and requirements as imposed by a TMDL. Until completion of TMDLs for the Mississippi River Basin, those suspected causes for impairment which are not directly attributed to the chemical bulk storage and transfer point source category have been eliminated in the formulation of effluent limitations and other requirements of this permit. Additionally, suspected causes of impairment which could be attributed to pollutants which were not determined to be discharged at a level which would cause, have the reasonable potential to cause or contribute to an excursion above any present state water quality standard were also eliminated.

The stormwater discharges from this facility have the potential to discharge pollutants which may contribute to the dissolved oxygen impairment of the receiving waterbody. The dissolved oxygen impairment shall be addressed through the TOC parameter included in the effluent limitations and monitoring requirements for Outfalls 001 and 002.

## 6. PROPOSED EFFLUENT LIMITS

BASIS - See Rationale below.

- A. Outfalls 020, 020 (A), and 020 (B) have been deleted.
- B. Limitations based on commodities stored and potential stored commodities at the facility have been added to Outfalls 001 and 002.
- C. The monitoring frequencies of flow, TOC, Oil and Grease, and pH have been increased from 1/quarter to 1/month to be consistent with other chemical bulk storage facilities.

## 7. COMPLIANCE HISTORY/COMMENTS

- A. OEC – There are no open, appealed, or pending OES enforcement actions as of November 24, 2008.  
There are no recent inspections on file as of November 24, 2008.
- B. DMR Review/Excursions – A DMR review from December 2006 through September 2008 noted no excursions in permitted limits. All DMRs were on file.

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## 8. EXISTING EFFLUENT LIMITS

Outfall 001 – intermittent low contamination potential stormwater runoff from 11.5 acres on the north side of the former main processing area

Outfall 002 – intermittent low contamination potential stormwater runoff from 13 acres on the south side of the former main processing area

| Pollutant         | Monthly Average | Daily Maximum | Frequency  |
|-------------------|-----------------|---------------|------------|
| Flow              | Report          | Report        | 1/ quarter |
| TOC               | ---             | 50 mg/L       | 1/ quarter |
| Oil & Grease      | ---             | 15 mg/L       | 1/ quarter |
| pH Min/Max Values | 6.0 (min)       | 9.0 (max)     | 1/ quarter |

Outfall 020 – continuous discharge of low contamination potential stormwater runoff from 15 acres of the Boke' area and treated sanitary wastewater

| Pollutant | Monthly Average | Daily Maximum | Frequency  |
|-----------|-----------------|---------------|------------|
| Flow      | Report          | Report        | 1/ quarter |
| Mercury   | Report          | Report        | 1/ quarter |

Outfall 020 (A) – intermittent discharge of low contamination potential stormwater runoff from 15 acres of the Boke' area

| Pollutant         | Monthly Average | Daily Maximum | Frequency  |
|-------------------|-----------------|---------------|------------|
| Flow              | Report          | Report        | 1/ quarter |
| TOC               | ---             | 50 mg/L       | 1/ quarter |
| Oil & Grease      | ---             | 15 mg/L       | 1/ quarter |
| pH Min/Max Values | 6.0 (min)       | 9.0 (max)     | 1/ quarter |

Outfall 020 (B) – continuous discharge of treated sanitary wastewater

| Pollutant         | Monthly Average | Weekly Average | Frequency  |
|-------------------|-----------------|----------------|------------|
| Flow              | Report          | Report         | 1/ quarter |
| BOD <sub>5</sub>  | 30 mg/L         | 45 mg/L        | 1/ quarter |
| TSS               | 30 mg/L         | 45 mg/L        | 1/ quarter |
| Fecal Coliform    | 200 col/100ml   | 400 col/100ml  | 1/ quarter |
| pH Min/Max Values | 6.0 (min)       | 9.0 (max)      | 1/ quarter |

## 9. ENDANGERED SPECIES

The receiving waterbody, Subsegment 070201 of the Mississippi River Basin, has been identified by the U.S. Fish and Wildlife Service (FWS) as habitat for the Pallid Sturgeon, which is listed as a threatened species. Consultation with the Service is required if the proposed permit is in sensitive waters and contains one or more listed substances. The draft permit is in listed sensitive waters and contains monitoring of Endosulfan, Hexachlorobenzene, 2, 3, 7, 8-TCDD, Arsenic, Chromium III, Chromium VI, Zinc, Cadmium, Copper, Lead, Mercury, Nickel, Cyanide, and Pentachlorophenol if a commodity containing one of the above –mentioned substances is stored or transferred at the facility. Therefore, this draft permit has been submitted to the FWS for review in accordance with a letter dated November 17, 2008 from Rieck (FWS) to Nolan (LDEQ). The effluent limitations established in the permit ensure protection of aquatic life and maintenance of the receiving water as

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aquatic habitat. Therefore, the issuance of the LPDES permit is not likely to have an adverse effect on any endangered or candidate species or the critical habitat.

The receiving waterbody, Subsegment 070504 of the Mississippi River Basin is not listed in Section II.2 of the Implementation Strategy as requiring consultation with the U.S. Fish and Wildlife Service (FWS). This strategy was submitted with a letter dated November 17, 2008 from Rieck (FWS) to Nolan (LDEQ). Therefore, in accordance with the Memorandum of Understanding between the LDEQ and the FWS, no further informal (Section 7, Endangered Species Act) consultation is required. The effluent limitations established in the permit ensure protection of aquatic life and maintenance of the receiving water as aquatic habitat. Therefore, the issuance of the LPDES permit is not likely to have an adverse effect on any endangered or candidate species or the critical habitat.

#### **10. HISTORIC SITES**

The discharge is from an existing facility location, which does not include an expansion on undisturbed soils. Therefore, there should be no potential effect to sites or properties on or eligible for listing on the National Register of Historic Places, and in accordance with the "Memorandum of Understanding for the Protection of Historic Properties in Louisiana Regarding LPDES Permits" no consultation with the Louisiana State Historic Preservation Officer is required.

#### **11. TENTATIVE DETERMINATION**

On the basis of preliminary staff review, the Department of Environmental Quality has made a tentative determination to issue a permit for the discharge described in the application.

#### **12. PUBLIC NOTICES**

Upon publication of the public notice, a public comment period shall begin on the date of publication and last for at least 30 days thereafter. During this period, any interested persons may submit written comments on the draft permit and may request a public hearing to clarify issues involved in the permit decision at this Office's address on the first page of the statement of basis. A request for a public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing.

Public notice published in:

Local newspaper of general circulation

Office of Environmental Services Public Notice Mailing List

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### Rationale for CEMUS, LLC

1. **Outfall 001** - industrial stormwater runoff from the north side of the facility  
**Outfall 002** - industrial stormwater runoff from the south side of the facility

| Pollutant                              | Limitation   |           | Reference |
|----------------------------------------|--------------|-----------|-----------|
|                                        | Monthly Avg. | Daily Max |           |
| Flow-MGD                               | Report       | Report    | *, BPJ    |
| TOC                                    | ---          | 50 mg/L   | *, BPJ    |
| Oil & Grease                           | ---          | 15 mg/L   | *, BPJ    |
| Total BTEX <sup>1</sup>                | ---          | 250 ug/L  | BPJ       |
| pH                                     | 6.0 su       | 9.0 su    | *, BPJ    |
| <b>METALS, CYANIDE, TOTAL PHENOLS</b>  |              |           |           |
| Antimony <sup>3</sup>                  | ---          | 600 ug/L  | BPJ       |
| Arsenic <sup>3</sup>                   | ---          | 100 ug/L  | BPJ       |
| Beryllium <sup>3</sup>                 | ---          | 100 ug/L  | BPJ       |
| Cadmium <sup>3</sup>                   | ---          | 100 ug/L  | BPJ       |
| Chromium <sup>3</sup>                  | ---          | 150 ug/L  | BPJ       |
| Copper <sup>3</sup>                    | ---          | 500 ug/L  | BPJ       |
| Lead <sup>1,3</sup>                    | ---          | 150 ug/L  | BPJ       |
| Mercury <sup>3</sup>                   | ---          | 10 ug/L   | BPJ       |
| Nickel <sup>3</sup>                    | ---          | 500 ug/L  | BPJ       |
| Selenium <sup>3</sup>                  | ---          | 100 ug/L  | BPJ       |
| Silver <sup>3</sup>                    | ---          | 100 ug/L  | BPJ       |
| Thallium <sup>3</sup>                  | ---          | 100 ug/L  | BPJ       |
| Zinc <sup>3</sup>                      | ---          | 1000 ug/L | BPJ       |
| Total Cyanide <sup>3</sup>             | ---          | 100 ug/L  | BPJ       |
| Total Phenols <sup>2</sup>             | ---          | 500 ug/L  | BPJ       |
| <b>VOLATILE COMPOUNDS</b>              |              |           |           |
| Acrolein <sup>3</sup>                  | ---          | 100 ug/L  | BPJ       |
| Acrylonitrile <sup>3</sup>             | ---          | 100 ug/L  | BPJ       |
| Benzene <sup>1,3</sup>                 | ---          | 100 ug/L  | BPJ       |
| Bromoform <sup>3</sup>                 | ---          | 100 ug/L  | BPJ       |
| Carbon Tetrachloride <sup>3</sup>      | ---          | 100 ug/L  | BPJ       |
| Chlorobenzene <sup>3</sup>             | ---          | 100 ug/L  | BPJ       |
| Chlorodibromomethane <sup>3</sup>      | ---          | 100 ug/L  | BPJ       |
| Chloroethane <sup>3</sup>              | ---          | 100 ug/L  | BPJ       |
| 2-Chloroethyl Vinyl Ether <sup>3</sup> | ---          | 100 ug/L  | BPJ       |
| Chloroform <sup>3</sup>                | ---          | 100 ug/L  | BPJ       |
| Dichlorobromomethane <sup>3</sup>      | ---          | 100 ug/L  | BPJ       |
| 1,1-Dichloroethane <sup>3</sup>        | ---          | 100 ug/L  | BPJ       |
| 1,2-Dichloroethane <sup>3</sup>        | ---          | 100 ug/L  | BPJ       |
| 1,1-Dichloroethylene <sup>3</sup>      | ---          | 100 ug/L  | BPJ       |
| 1,2-Dichloropropane <sup>3</sup>       | ---          | 100 ug/L  | BPJ       |
| 1,3-Dichloropropylene <sup>3</sup>     | ---          | 100 ug/L  | BPJ       |
| Ethylbenzene <sup>3</sup>              | ---          | 100 ug/L  | BPJ       |

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|                                            |     |              |     |
|--------------------------------------------|-----|--------------|-----|
| Bis (2-Chloroethyl) Ether <sup>3</sup>     | --- | 100 ug/L     | BPJ |
| Bis (2-Chloroisopropyl) Ether <sup>3</sup> | --- | 100 ug/L     | BPJ |
| Bis (2-Ethylhexyl) Phthalate <sup>3</sup>  | --- | 100 ug/L     | BPJ |
| Butyl Benzyl Phthalate <sup>3</sup>        | --- | 100 ug/L     | BPJ |
| Chrysene <sup>3</sup>                      | --- | 100 ug/L     | BPJ |
| Dibenzo (a,h) Anthracene <sup>3</sup>      | --- | 100 ug/L     | BPJ |
| Diethyl Phthalate <sup>3</sup>             | --- | 100 ug/L     | BPJ |
| Dimethyl Phthalate <sup>3</sup>            | --- | 100 ug/L     | BPJ |
| Di-N-Butyl Phthalate <sup>3</sup>          | --- | 100 ug/L     | BPJ |
| Di-N-Octyl Phthalate <sup>3</sup>          | --- | 100 ug/L     | BPJ |
| Fluoranthene <sup>3</sup>                  | --- | 100 ug/L     | BPJ |
| Fluorene <sup>3</sup>                      | --- | 100 ug/L     | BPJ |
| Hexachlorobenzene <sup>3</sup>             | --- | 100 ug/L     | BPJ |
| Hexachlorobutadiene <sup>3</sup>           | --- | 100 ug/L     | BPJ |
| Hexachlorocyclopentadiene <sup>3</sup>     | --- | 100 ug/L     | BPJ |
| Hexachloroethane <sup>3</sup>              | --- | 100 ug/L     | BPJ |
| Ideno (1,2,3-c,d) Pyrene <sup>3</sup>      | --- | 100 ug/L     | BPJ |
| Isophorone <sup>3</sup>                    | --- | 100 ug/L     | BPJ |
| Naphthalene <sup>3</sup>                   | --- | 100 ug/L     | BPJ |
| Nitrobenzene <sup>3</sup>                  | --- | 100 ug/L     | BPJ |
| N-Nitrosodimethylamine <sup>3</sup>        | --- | 100 ug/L     | BPJ |
| N-Nitrosodi-n-propylamine <sup>3</sup>     | --- | 100 ug/L     | BPJ |
| N-Nitrosodiphenylamine <sup>3</sup>        | --- | 100 ug/L     | BPJ |
| Phenanthrene <sup>3</sup>                  | --- | 100 ug/L     | BPJ |
| Pyrene <sup>3</sup>                        | --- | 100 ug/L     | BPJ |
| <b>PESTICIDES/HERBICIDES</b>               |     |              |     |
| Alpha-Endosulfan <sup>3</sup>              | --- | 10 ug/L      | BPJ |
| Beta-Endosulfan <sup>3</sup>               | --- | 10 ug/L      | BPJ |
| Endosulfan Sulfate <sup>3</sup>            | --- | 10 ug/L      | BPJ |
| Aldrin <sup>3</sup>                        | --- | 10 ug/L      | BPJ |
| Alpha-BHC <sup>3</sup>                     | --- | 10 ug/L      | BPJ |
| Beta-BHC <sup>3</sup>                      | --- | 10 ug/L      | BPJ |
| Gamma-BHC <sup>3</sup>                     | --- | 10 ug/L      | BPJ |
| Delta-BHC <sup>3</sup>                     | --- | 10 ug/L      | BPJ |
| Dieldrin <sup>3</sup>                      | --- | 10 ug/L      | BPJ |
| 4,4'-DDE <sup>3</sup>                      | --- | 10 ug/L      | BPJ |
| 4,4'-DDD <sup>3</sup>                      | --- | 10 ug/L      | BPJ |
| 4,4'-DDT <sup>3</sup>                      | --- | 10 ug/L      | BPJ |
| Heptachlor <sup>3</sup>                    | --- | 10 ug/L      | BPJ |
| Endrin Aldehyde <sup>3</sup>               | --- | 10 ug/L      | BPJ |
| Heptachlor Epoxide <sup>3</sup>            | --- | 10 ug/L      | BPJ |
| Chlordane <sup>3</sup>                     | --- | 10 ug/L      | BPJ |
| Toxaphene <sup>3</sup>                     | --- | 10 ug/L      | BPJ |
| PCB-1242 <sup>3</sup>                      | --- | <sup>4</sup> | BPJ |
| PCB-1254 <sup>3</sup>                      | --- | <sup>4</sup> | BPJ |
| PCB-1221 <sup>3</sup>                      | --- | <sup>4</sup> | BPJ |

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|                                    |     |              |     |
|------------------------------------|-----|--------------|-----|
| PCB-1232 <sup>3</sup>              | --- | <sup>4</sup> | BPJ |
| PCB-1248 <sup>3</sup>              | --- | <sup>4</sup> | BPJ |
| PCB-1260 <sup>3</sup>              | --- | <sup>4</sup> | BPJ |
| PCB-1016 <sup>3</sup>              | --- | <sup>4</sup> | BPJ |
| 2,3,7,8-TCDD (Dioxin) <sup>3</sup> | --- | 5ug/L        | BPJ |
| Endrin <sup>3</sup>                | --- | 5ug/L        | BPJ |

BPJ Best Professional Judgement

su Standard Units

\* LDEQ's guidance on stormwater, letter dated 6/17/87, from J. Dale Givens (LDEQ) to Myron Knudson (EPA Region 6)

1. This parameter shall be monitored if the outfall could potentially be affected by the handling and/or storage of commodities containing liquid or gaseous hydrocarbons.
2. This parameter shall be monitored if the outfall could potentially be affected by the handling and/or storage of commodities containing any phenolic compound.
3. This parameter shall be monitored if the outfall could potentially be affected by the handling and/or storage of commodities containing this parameter.
4. There shall be no discharge of polychlorinated biphenyls (PCBs).

**Treatment:** none

**Monitoring Frequency:** flow, TOC, oil and grease, and pH shall be monitored monthly.

All other parameters must be monitored once during each month in which the outfall could potentially be affected by handling and/or storing commodities containing one or more of the specified chemicals, and once a month for two months thereafter (e.g., if a commodity containing one or more of the specified chemicals is handled and/or stored within the tank farm, the specified parameter must be monitored at the outfall for the respective tank farm once during each month in which the specified chemical is handled and/or stored within that tank farm, and monitoring shall continue once per month for two months after the commodity is no longer handled and/or stored within that tank farm). If the effluent limitation is exceeded during either of these two additional months, then monitoring shall continue once per month until the limit is met for two consecutive months at which time monitoring for the specified parameter shall cease.

**Limits Justification:** flow, TOC, oil and grease, and pH limits are based on the previous permit and on LDEQ's guidance on stormwater, letter dated 6/17/87, from J. Dale Givens (LDEQ) to Myron Knudson (EPA Region 6).

The Total Phenols parameter is included in the permit based on BPJ because the facility may handle and/or store commodities that contain phenolic compounds, and there is potential for leaks and spills during the transfer of the products. The effluent limit is based on current LDEQ practices.

All other parameters are included in the permit based on BPJ because of the potential for the facility to handle and/or store commodities containing metals, volatile compounds, acid compounds, base/neutral compounds and pesticides/herbicides, and because there is potential for leaks and spills during the transfer of the products. The effluent limitations are based on state empirical limitations and are consistent with current LDEQ practices for permitting stormwater with potential to discharge these types



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of pollutants.

This facility is not subject to Effluent Limitations Guidelines for Transportation Equipment Cleaning, 40 CFR Part 442, because, in accordance with 40 CFR 442.1.a, "this part applies to discharges resulting from cleaning the interior of tanks used to transport chemical, petroleum or food grade cargos" and 40 CFR 442.1.b, "This part is not applicable to... wastewaters resulting from cleaning the interiors of drums, intermediate bulk containers, or closed top hoppers." This facility does not clean tanks used to transport cargo.

### **STORM WATER POLLUTION PREVENTION PLAN (SWP3) REQUIREMENT**

A SWP3 is included in the permit because there is a potential for storm water contamination from the loading and unloading of chemicals.

The SWP3 shall be prepared, implemented, and maintained within six (6) months of the effective date of the final permit. The plan should identify potential sources of storm water pollution and ensure the implementation of practices to prevent and reduce pollutants in storm water discharges associated with industrial activity at the facility (see Part II, Paragraph M of the Draft Permit).